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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.
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EXAMINER

CINTINS, J

ART UNIT

PAPER NUMBER

1724

DATE MAILED:

12/06/00

Please find below and/or attached an Office communication concerning this application or proceeding.

Commissioner of Patents and Trademarks

Office Action Summary

Application No.

09/582,175

Applicant(s)

Darmawan

Examiner

Ivars C. Cintins

Group Art Unit

1724



Responsive to communication(s) filed on _____

This action is **FINAL**.

Since this application is in condition for allowance except for formal matters, **prosecution as to the merits is closed** in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11; 453 O.G. 213.

A shortened statutory period for response to this action is set to expire 3 month(s), or thirty days, whichever is longer, from the mailing date of this communication. Failure to respond within the period for response will cause the application to become abandoned. (35 U.S.C. § 133). Extensions of time may be obtained under the provisions of 37 CFR 1.136(a).

Disposition of Claims

☒ Claim(s) 1-5 is/are pending in the application.

Of the above, claim(s) _____ is/are withdrawn from consideration.

☐ Claim(s) _____ is/are allowed.

☒ Claim(s) 1-5 is/are rejected.

☐ Claim(s) _____ is/are objected to.

☐ Claims _____ are subject to restriction or election requirement.

Application Papers

☐ See the attached Notice of Draftsperson's Patent Drawing Review, PTO-948.

☐ The drawing(s) filed on _____ is/are objected to by the Examiner.

The proposed drawing correction, filed on _____ is ☐ approved ☐ disapproved.

☐ The specification is objected to by the Examiner.

☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. § 119

☒ Acknowledgement is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d).

☒ All ☐ Some* ☐ None of the CERTIFIED copies of the priority documents have been received.

☐ received in Application No. (Series Code/Serial Number) _____.

☒ received in this national stage application from the International Bureau (PCT Rule 17.2(a)).

*Certified copies not received: _____

Acknowledgement is made of a claim for domestic priority under 35 U.S.C. § 119(e).

Attachment(s)

☒ Notice of References Cited, PTO-892

☒ Information Disclosure Statement(s), PTO-1449, Paper No(s). 4, 6 & 8

Interview Summary, PTO-413

Notice of Draftsperson's Patent Drawing Review, PTO-948

Notice of Informal Patent Application, PTO-152

--- SEE OFFICE ACTION ON THE FOLLOWING PAGES ---

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The disclosure is objected to because of the following informalities:

(1) the illustrations appearing on pages 7 and 8 of the specification are not permitted (see 37 CFR 1.58(a)); and

(2) Figures 1, 2a, 2b, 3a and 3b of the Drawings appear to be prior art (see page 11, lines 2-3, 14-16 and 27-29 of the specification), and therefore must be labeled as such (see M.P.E.P. § 608.02(g)).

Appropriate correction is required.

The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

Claims 1-5 are rejected under 35 U.S.C. § 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which Applicant regards as the invention. The claims contain numerous vague and indefinite expressions. For example, the terms: "using U-tube principle" (claim 1, line 1), "utilizing" (claim 1, line 2), "significantly" (claims 2, 3 and 5, line 3), "is considered" (claim 3, line 2), "using modified U-tube of 180° angle" (claim 4, line 1), etc. are vague, and indefinite as to the limitations

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intended. Also, the terms "the nozzle bed" (claim 1, line 3), "the nozzle openings" (claim 1, line 5), "the service flow" (claim 2, line 2), "the second compartment" (claim 2, lines 3-4), "the backwash fluid" (claim 2, line 4), "the inlet port" (claim 2, line 5), "the first compartment" (claim 2, line 5), "the backwash outlet port" (claim 2, line 6), etc. lack antecedent basis in the claims, and are therefore also indefinite.

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless --

(a) the invention was known or used by others in this country, or patented or described in a printed publication in this or a foreign country, before the invention thereof by the applicant for a patent.

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

Claim 1 is rejected under 35 U.S.C. 102(a) as being anticipated by Jones (U.S. Patent No. 5,972,211). Screens 22 of the reference device are deemed to be structurally and patentably indistinguishable from the broadly recited "nozzle" elements of claim 1. Applicant cannot rely upon the foreign priority papers to overcome this rejection because a translation of said papers has not been made of record in accordance with 37 CFR 1.55. See MPEP § 201.15.

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Claim 1 is rejected under 35 U.S.C. 102(b) as being anticipated by Astrom (U.S. Patent No. 1,688,915). Strainers 5 and 6 of the reference device are deemed to be structurally and patentably indistinguishable from the broadly recited "nozzle" elements of claim 1.

Claim 4 is rejected under 35 U.S.C. 102(b) as being anticipated by Siegers (U.S. Patent No. 4,461,796). The reference discloses an ion exchange process using a vertical straight tube equipped with upper and lower beds (2 and 3), a controllable backwash port (16), and nozzle openings (5); and this is all that is required by claim 4.

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

Claims 2 and 3 are rejected under 35 U.S.C. 103(a) as being unpatentable over Jones or Astrom. Each of the references discloses the claimed invention with the exception of the step of backwashing only upon detection of a significant increase in pressure drop across the treatment material. However, since

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increased pressure drop across a treatment bed is indicative of bed clogging, it would have been obvious to one of ordinary skill in the art at the time the invention was made to backwash the treatment beds in either Jones or Astrom in the manner recited in claims 1 and 3.

Claims 5 is rejected under 35 U.S.C. 103(a) as being unpatentable over Siegers. The reference discloses the claimed invention with the exception of the step of backwashing only upon detection of a significant increase in pressure drop across the treatment material. However, since increased pressure drop across a treatment bed is indicative of bed clogging, it would have been obvious to one of ordinary skill in the art at the time the invention was made to backwash the treatment beds in Siegers in the manner recited in claim 5.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to I. Cintins whose telephone number is (703) 305-3840. The examiner can normally be reached on Monday through Friday from 9:30 AM to 6:00 PM.

The fax phone numbers for this art unit are: (703) 305-3599 for "Official" faxes after Final Rejection; (703) 305-7718 for all other "Official" faxes; and (703) 305-3602 for "Draft" and other "Unofficial" faxes.

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Any inquiry of a general nature or relating to the status of this application should be directed to the Group receptionist whose telephone number is (703) 308-0661.

Ivars C. Cintins
Ivars C. Cintins
Primary Examiner
Art Unit 1724

I. Cintins
December 5, 2000